

Montana Department of Natural Resources and Conservation
Water Resources Division
Water Rights Bureau

ENVIRONMENTAL ASSESSMENT
For Routine Actions with Limited Environmental Impact

Part I. Proposed Action Description

1. Applicant/Contact name and address:

Applicant:

Nancy C. Gruehl
PO Box 333
Gardiner, MT 59030-0333

2. Type of action: Application for a Beneficial Water Use Permit No. 43B 30104536. The Applicant proposes to divert water via a moveable pump from the Yellowstone River at 33 gallons per minute (GPM), up to 9 acre-feet (AF), for the purpose of lawn and garden irrigation on 3.60 acres.
3. Water source name: Yellowstone River
4. Location affected by project: W2NWSW, Section 12, T08 S, R07 E, Park County, approximately 10 miles northwest of Gardiner, Montana.



Figure 1: Map of the location affected by the project.

5. Narrative summary of the proposed project, purpose, action to be taken, and benefits: The Applicant requests a Beneficial Water Use Permit in the amount of 33 GPM up to 9 AF for the purpose of lawn and garden irrigation on 3.60 acres. Water will be diverted from the Yellowstone River via a moveable pump in the SWNWSW, Section 12, T08 S, R07 E, Park County, to the place of use in the W2NWSW, Section 12, T08 S, R07 E, Park County. The requested period of diversion is April 1 to October 31.

The DNRC shall issue a water use permit if an applicant proves the criteria in 85-2-311 MCA are met.

6. Agencies consulted during preparation of the Environmental Assessment:
- Montana Department of Fish, Wildlife & Parks (FWP) – Montana Fisheries Information System (MFISH)
 - <http://fwp.mt.gov/fishing/mFish/>
 - Montana Department of Environmental Quality (DEQ) – Clean Water Act Information Center (CWAIC)
 - <http://deq.mt.gov/wqinfo/CWAIC/default.mcpX>
 - Montana National Heritage Program (MTNHP) – Species of Concern:
 - <http://mtnhp.org/SpeciesOfConcern>
 - U.S. Fish & Wildlife Service (USFWS) – National Wetlands Inventory Wetlands Mapper
 - <http://www.fws.gov/wetlands/Data/Mapper.html>
 - Natural Resource Conservation Service (NRCS) – Web Soil Survey (WSS)
 - <http://websoilsurvey.sc.egov.usda.gov/App/HomePage.htm>

Part II. Environmental Review

1. Environmental Impact Checklist:

PHYSICAL ENVIRONMENT

WATER QUANTITY, QUALITY AND DISTRIBUTION

Water quantity - Assess whether the source of supply is identified as a chronically or periodically dewatered stream by DFWP. Assess whether the proposed use will worsen the already dewatered condition.

Determination: No significant impact identified. As determined by a search of MFISH conducted on February 16, 2017, this stretch of the Yellowstone River is not listed as periodically or chronically dewatered. The small volume of water diverted under this permit will not have a significant impact on the periodically dewatered stretch of river downstream from the project area as several tributaries feed into the Yellowstone River between the project site and the upper bound of this dewatered concern area. The diverted, non-consumed volume of water under this permit will return to the source almost instantaneously.

Water quality - Assess whether the stream is listed as water quality impaired or threatened by DEQ, and whether the proposed project will affect water quality.

Determination: No significant impact identified. According to a search of the DEQ CWAIC website conducted on February 16, 2017, this stretch of the Yellowstone River has not been assessed for support of primary contact recreation, agricultural, or drinking water uses. This reach has been classified as not fully supporting aquatic life due to loss of riparian habitat and streambank destabilization. The cause of this problem is listed as alteration in stream-side or littoral vegetative covers and physical substrate habitat alterations. This permit will not have any significant impacts on water quality because the irrigation system will not significantly disturb the streamside vegetation or physical substrate of the streambank.

Groundwater - Assess if the proposed project impacts ground water quality or supply. If this is a groundwater appropriation, assess if it could impact adjacent surface water flows.

Determination: No significant impact identified. This permit is for surface water and will not significantly impact groundwater quality or supply.

DIVERSION WORKS - Assess whether the means of diversion, construction and operation of the appropriation works of the proposed project will impact any of the following: channel impacts, flow modifications, barriers, riparian areas, dams, well construction.

Determination: No significant impact identified. The Applicant proposes to divert water via a small, movable pump. The pumping of water from the river will not cause significant channel impacts, significantly modify flow conditions, or create significant flow barriers. Dams and wells are not involved in this project.

UNIQUE, ENDANGERED, FRAGILE OR LIMITED ENVIRONMENTAL RESOURCES

Endangered and threatened species - Assess whether the proposed project will impact any threatened or endangered fish, wildlife, plants or aquatic species or any “species of special concern,” or create a barrier to the migration or movement of fish or wildlife. For groundwater, assess whether the proposed project, including impacts on adjacent surface flows, would impact any threatened or endangered species or “species of special concern.”

Determination: No significant impact identified. The Montana Heritage Program’s website was queried on February 16, 2017, for plant and animal species located within the project area. Results are summarized below.

- Animal Species of Concern – eleven (11): Bison, Wolverine, Canada Lynx, Grizzly Bear, Golden Eagle, Evening Grosbeak, Cassin’s Finch, Clark’s Nutcracker, Green-tailed Towhee, Brewer’s Sparrow, Yellowstone Cutthroat Trout
- Animal Potential Species of Concern: None
- Animal Special Status Species – one (1): Bald Eagle
- Plant Species of Concern: None
- Plant Potential Species of Concern: None
- Plant Special Status Species: None

The proposed project is to pump water from the river to be used on private property. The small quantity of water requested will not have any significant impact on wildlife in the area.

Wetlands - Consult and assess whether the apparent wetland is a functional wetland (according to COE definitions), and whether the wetland resource would be impacted.

Determination: Not applicable. According to a February 16, 2017, search of the USFWS Wetlands Mapper, there are no wetland areas in the project area.

Ponds - *For ponds, consult and assess whether existing wildlife, waterfowl, or fisheries resources would be impacted.*

Determination: Not applicable. No ponds are involved in this project.

GEOLOGY/SOIL QUALITY, STABILITY AND MOISTURE - *Assess whether there will be degradation of soil quality, alteration of soil stability, or moisture content. Assess whether the soils are heavy in salts that could cause saline seep.*

Determination: No significant impact identified. The operation of a small, mobile pump for the purpose of landscape irrigation will not degrade soil quality, stability or moisture content. A February 16, 2017, search of the NRCS WSS site did not identify any saline seeps in the area.

VEGETATION COVER, QUANTITY AND QUALITY/NOXIOUS WEEDS - *Assess impacts to existing vegetative cover. Assess whether the proposed project would result in the establishment or spread of noxious weeds.*

Determination: No significant impact identified. The proposed project will pump water via a small moveable pump and will not utilize any permanent diversion structures. Impacts to the riparian vegetation will not be significant. This project should not increase the risk of spread of noxious weeds.

AIR QUALITY - *Assess whether there will be a deterioration of air quality or adverse effects on vegetation due to increased air pollutants.*

Determination: No impact identified. This project will use an electric pump that will not produce emissions that may degrade air quality.

HISTORICAL AND ARCHEOLOGICAL SITES - *Assess whether there will be degradation of unique archeological or historical sites in the vicinity of the proposed project if it is on State or Federal Lands. If it is not on State or Federal Lands simply state NA-project not located on State or Federal Lands.*

Determination: Not applicable. The project is not located on State or Federal Lands. Furthermore, the Applicant made no mention of significant historical or archeological sites on the property.

DEMANDS ON ENVIRONMENTAL RESOURCES OF LAND, WATER, AND ENERGY - *Assess any other impacts on environmental resources of land, water and energy not already addressed.*

Determination: No impact identified. No other demands on environmental resources of land, water and energy have been identified.

HUMAN ENVIRONMENT

LOCALLY ADOPTED ENVIRONMENTAL PLANS AND GOALS - *Assess whether the proposed project is inconsistent with any locally adopted environmental plans and goals.*

Determination: No significant impact identified. The Applicant's goal is to pump water for the purpose of lawn and garden irrigation. This is recognized as a beneficial use of water and does not conflict with locally adopted environmental plans or goals.

ACCESS TO AND QUALITY OF RECREATIONAL AND WILDERNESS ACTIVITIES - *Assess whether the proposed project will impact access to or the quality of recreational and wilderness activities.*

Determination: No impact identified. This permit will not affect access to recreational activities or the quality of recreational and wilderness activities. This project is contained entirely on private property, and the Applicant proposes to pump water from the Yellowstone River that flows directly adjacent to the property boundary.

HUMAN HEALTH - *Assess whether the proposed project impacts on human health.*

Determination: No impact identified. This permit will not create any human health concerns.

PRIVATE PROPERTY - *Assess whether there are any government regulatory impacts on private property rights.*

Yes___ No X If yes, analyze any alternatives considered that could reduce, minimize, or eliminate the regulation of private property rights.

Determination: No impact identified. The project does not impact government regulations on private property rights.

OTHER HUMAN ENVIRONMENTAL ISSUES - *For routine actions of limited environmental impact, the following may be addressed in a checklist fashion.*

Impacts on:

- (a) Cultural uniqueness and diversity? No impacts identified.
- (b) Local and state tax base and tax revenues? No significant impacts identified.
- (c) Existing land uses? No significant impacts identified.
- (d) Quantity and distribution of employment? No significant impacts identified.
- (e) Distribution and density of population and housing? No impacts identified.
- (f) Demands for government services? No significant impacts identified.

- (g) Industrial and commercial activity? No significant impacts identified.
- (h) Utilities? No impacts identified.
- (i) Transportation? No impacts identified.
- (j) Safety? No impacts identified.
- (k) Other appropriate social and economic circumstances? No impacts identified.

2. *Secondary and cumulative impacts on the physical environment and human population:*

Secondary Impacts: No secondary impacts have been identified.

Cumulative Impacts: No cumulative impacts have been identified.

- 3. *Describe any mitigation/stipulation measures:*** A condition has been placed on this permit to prevent adversely affecting instream flow water rights owned by Montana Department of Fish, Wildlife and Parks.
- 4. *Description and analysis of reasonable alternatives to the proposed action, including the no action alternative, if an alternative is reasonably available and prudent to consider:*** The Applicant could drill a well to provide the quantity of water requested, however, this would be very costly. There are no local municipalities to purchase water from for the purpose of lawn and garden irrigation. The no-action alternative would be to not divert water, which would not allow the Applicant to manage privately owned property as desired.

PART III. Conclusion

- 1. *Preferred Alternative:*** The preferred alternative is to grant the application, if the Applicant can prove that the criteria in § 85-2-311, MCA, are met.
- 2. *Comments and Responses:*** None at this time.
- 3. *Finding:***
 Yes___ No X Based on the significance criteria evaluated in this EA, is an EIS required?

If an EIS is not required, explain why the EA is the appropriate level of analysis for this proposed action:

Name of person(s) responsible for preparation of EA:

Name: Brant Lumpkin

Title: Water Resource Specialist

Date: 02/16/2017